

U.S. Serial No.: 09/883,546

Response to the Office Action dated September 16, 2010

This listing of claims will replace all prior versions, and listings, of claims in the application.

**The Status of the Claims**

1 - 2. (Cancelled)

3. (Previously Presented) A method as defined in claim 194, further comprising waiting for passage of a predetermined amount of time from a previous prompting decision.

4. (Previously Presented) A method as defined in claim 194, further comprising determining the program being viewed at the first location.

5. (Previously Presented) A method as defined in claim 194, further comprising prompting the audience member to enter the audience member identification upon detection that the receiver has been turned on.

6 – 9. (Cancelled)

10. (Previously Presented) A method as defined in claim 194, wherein the log of audience members identifies one or more additional audience members of the audience of the program.

11. (Previously Presented) A method as defined in claim 194, further comprising determining a second probability that the second audience member is in the audience based on the first viewing count and the second viewing count.

12. (Previously Presented) A method as defined in claim 11, wherein the first audience member is in the audience of the program during a first time interval, the second audience member is in the audience of the program during a second time interval, the second time interval at least partially overlapping the first time interval.

13. (Cancelled)

14. (Previously Presented) A method as defined in claim 194, further comprising: storing audience identification data in tables; and collapsing the tables if the tables contain insufficient data to make a prompting decision.

15. (Previously Presented) A method as defined in claim 14, wherein the collapsing of the tables is weighted depending upon age of the audience member identification data.

16. (Previously Presented) A method as defined in claim 194, wherein determining the probability that the audience member is in the audience of the program being viewed at the first location comprises determining a variable as a function of a number of times that the

audience member has viewed programs at the first location and a number of times that the measurement apparatus was active.

17. (Previously Presented) A method as defined in claim 16, wherein the determination of the variable comprises determining the variable as a function of a number of times that the audience member has viewed programs at the first location during a predetermined day part and a number of times that a receiver was turned on during the predetermined day part.

18. (Previously Presented) A method as defined in claim 16, wherein the determination of the variable comprises determining the variable as a function of a number of times that the audience member has viewed programs at the first location during a predetermined day part over a predetermined amount of time and a number of times that a receiver was turned on during the predetermined day part over the predetermined amount of time.

19. (Previously Presented) A method as defined in claim 16, wherein the determination of the variable comprises determining the variable as a function of a number of times that the audience member has viewed programs at the first location during a predetermined amount of time and a number of times that a receiver was turned on during the predetermined amount of time.

20. (Previously Presented) A method as defined in claim 16, wherein the determination of the variable comprises determining the variable as a function of a number of times that the audience member has viewed programs at the first location by a predetermined day part and by a SID and a number of times that a receiver was turned on by the predetermined day part and by the SID.

21. (Previously Presented) A method as defined in claim 16, wherein the determination of the variable comprises determining the variable as a function of a number of times that the audience member has viewed programs at the first location by a predetermined day part over a predetermined amount of time and by a SID and a number of times that the receiver was turned on during the predetermined day part over the predetermined amount of time and by the SID.

22. (Previously Presented) A method as defined in claim 16, wherein the determination of the variable comprises determining the variable as a function of a number of times that the audience member has viewed programs at the first location during a predetermined amount of time and by a SID and a number of times that the receiver was turned on during the

predetermined amount of time and by the SID.

23. (Previously Presented) A method as defined in claim 16, wherein the determination of the variable comprises determining the variable as a function of a number of times that the audience member has viewed programs at the first location by a SID and a number of times that the receiver was turned on by the SID.

24 – 36. (Cancelled)

37. (Previously Presented) A method as defined in claim 16, further comprising storing audience identification data in tables and collapsing the tables if the tables contain insufficient data to make a prompting decision.

38. (Previously Presented) A method as defined in claim 37, wherein the collapsing of the tables is weighted depending upon age of the audience member identification data.

39 – 40. (Cancelled)

41. (Previously Presented) The method of claim 16, further comprising prompting the audience member to enter the audience member identification when the variable is not equal to a current persons count and is greater than the threshold.

42 – 47. (Cancelled)

48. (Previously Presented) A method as defined in claim 194, wherein the first probability is based on a number of times that the audience member has viewed programs at the first location and a number of times that the audience measurement system was turned on

49 – 53. (Cancelled)

54. (Previously Presented) A method as defined in claim 194, further comprising applying a heuristic to determine the probability that the first audience member is in the audience of the program being viewed at the first location.

55. (Cancelled)

56. (Previously Presented) A method as defined in claim 54, further comprising applying the heuristic based upon a number of times that the first audience member viewed programs at the first location during a corresponding day part.

57. (Previously Presented) A method as defined in claim 54, wherein the application of a heuristic to determine whether the first audience member is in an audience of a receiver comprises determining a variable as a function of a number of times that the first audience member has viewed programs at the first location and a number of times that the measurement

apparatus at the first location was turned on.

58. (Previously Presented) A method as defined in claim 57, wherein the determination of a variable comprises determining the variable as a function of a number of times that the first audience member has viewed programs at the first location during a predetermined day part and a number of times that the measurement apparatus at the first location was turned on during the predetermined day part.

59. (Previously Presented) A method as defined in claim 57, wherein the determination of a variable comprises determining the variable as a function of a number of times that the first audience member has viewed programs at the first location during a predetermined day part over a predetermined amount of time and a number of times that the measurement apparatus at the first location was turned on during the predetermined day part over the predetermined amount of time.

60. (Previously Presented) A method as defined in claim 57, wherein the determination of a variable comprises determining the variable as a function of a number of times that the first audience member has viewed programs at the first location during a predetermined amount of time and a number of times that the measurement apparatus at the first location was turned on during the predetermined amount of time.

61. (Previously Presented) as defined in method as defined in claim 57, wherein the determination of a variable comprises determining the variable as a function of a number of times that the first audience member has viewed programs at the first location by a predetermined day part and by a SID and a number of times that the measurement apparatus at the first location was turned on by the predetermined day part and by the SID.

62. (Previously Presented) A method as defined in claim 57, wherein the determination of a variable comprises determining the variable as a function of a number of times that the first audience member has viewed programs at the first location by a predetermined day part over a predetermined amount of time and by a SID and a number of times that the measurement apparatus at the first location was turned on during the predetermined day part over the predetermined amount of time and by the SID.

63. (Previously Presented) A method as defined in claim 57, wherein the determination of a variable comprises determining the variable as a function of a number of times that the first audience member has viewed programs at the first location during a

predetermined amount of time and by a SID and a number of times that the measurement apparatus at the first location was turned on during the predetermined amount of time and by the SID.

64. (Previously Presented) A method as defined in claim 57, wherein the determination of a variable comprises determining the variable as a function of a number of times that the first audience member has viewed programs at the first location by a SID and a number of times that the measurement apparatus at the first location was turned on by the SID.

65 – 66. (Cancelled)

67. (Previously Presented) A method as defined in claim 54, further comprising storing audience identification data in tables; collapsing the tables if the tables contain insufficient data to make a prompting decision.

68. (Previously Presented) A method as defined in claim 194, wherein the probability is based upon tuning history and tuning style.

69. (Previously Presented) A method as defined in claim 68, wherein the tuning style comprises at least one of tuning velocity, tuning acceleration, tuning velocity and tuning acceleration, or program clustering.

70 – 75. (Cancelled)

76. (Previously Presented) A method as defined in claim 68, further comprising: storing audience identification data in tables; and collapsing the tables if the tables contain insufficient data to make a prompting decision.

77. (Previously Presented) A method as defined in claim 194, further comprising determining the first probability based upon a tuning style; determining a variable as a function of a number of times that the audience member has viewed programs at the first location and a number of times that an audience measurement system at the first location was turned on; and displaying a prompt to the audience member to enter the audience member identification if the variable is not greater than a second threshold and if the probability is not greater than the threshold.

78. (Previously Presented) A method as defined in claim 77, wherein the tuning style comprises at least one of tuning velocity, tuning acceleration, tuning velocity and tuning acceleration, or program clustering.

79 – 81. (Cancelled)

82. (Previously Presented) A method as defined in claim 77, wherein the determination of a variable comprises determining the variable as a function of a number of times that the first audience member has viewed programs at the first location during a predetermined day part and a number of times that the measurement apparatus at the first location was turned on during the predetermined day part,

83. (Previously Presented) A method as defined in claim 77, wherein the determination of a variable comprises determining the variable as a function of a number of times that the first audience member has viewed programs at the first location during a predetermined day part over a predetermined amount of time and a number of times that the measurement apparatus at the first location was turned on during the predetermined day part over the predetermined amount of time.

84. (Previously Presented) A method as defined in claim 77, wherein the determination of a variable comprises determining the variable as a function of a number of times that the first audience member has viewed programs at the first location during a predetermined amount of time and a number of times that the measurement apparatus at the first location was turned on during the predetermined amount of time.

85. (Previously Presented) A method as defined in claim 77, wherein the determination of a variable comprises determining the variable as a function of a number of times that the first audience member has viewed programs at the first location by a predetermined day part and by a SID and a number of times that the measurement apparatus at the first location was turned on by the predetermined day part and by the SID.

86. (Previously Presented) A method as defined in claim 77, wherein the determination of a variable comprises determining the variable as a function of a number of times that the first audience member has viewed programs at the first location by a predetermined day part over a predetermined amount of time and by a SID and a number of times that the measurement apparatus at the first location was turned on during the predetermined day part over the predetermined amount of time and by the SID.

87. (Previously Presented) A method as defined in claim 77, wherein the determination of a variable comprises determining the variable as a function of a number of times that the first audience member was has viewed programs at the first location during a

predetermined amount of time and by a SID and a number of times that the measurement apparatus at the first location was turned on during the predetermined amount of time and by the SID.

88. (Previously Presented) A method as defined in claim 77, wherein the determination of a variable comprises determining the variable as a function of a number of times that the first audience member has viewed programs at the first location by a SID and a number of times that the measurement apparatus at the first location was turned on by the SID.

89. (Previously Presented) The method of claim 77 wherein the method is executed only after the passage of a predetermined amount of time from a previous prompting decision.

90. (Previously Presented) The method of claim 77 further comprising:  
initially displaying a prompt to the first audience member to enter the audience member identification upon detection that the receiver has been turned on; and  
executing the method only after the passage of a predetermined amount of time from the initial prompting.

91 – 95. (Cancelled)

96. (Previously Presented) An article of manufacture as defined in claim 200 wherein the machine readable instructions cause the machine to determine the first probability based on a number of times that the audience member has historically viewed programs at the first location.

97. (Previously Presented) An article of manufacture as defined in claim 96, wherein the machine readable instructions cause the machine to determine the first probability based on a number of times that the measurement apparatus at the first location has been turned on.

98. (Cancelled)

99. (Previously Presented) An article of manufacture as defined in claim 96, wherein the number of times that the audience member was historically in the audience of at first location and the number of times that the measurement apparatus at the first location has been turned on are based on the day part.

100. (Previously Presented) An article of manufacture as defined in claim 96, wherein the number of times that the audience member was historically in the audience of at the first location and the number of times that the measurement apparatus at the first location has been turned on are based on a source identification (SID) code.

101. (Previously Presented) An article of manufacture as defined in claim 96, wherein

the probability is based upon on at least one of tuning style or tuning patterns.

102. (Cancelled)

103. (Previously Presented) An article of manufacture as defined in claim 200, wherein the machine readable instructions cause the machine to determine the first probability using a heuristic.

104. (Previously Presented) An article of manufacture as defined in claim 103, wherein the heuristic utilizes at least one of: a number of times that the audience member has viewed programs at the first location; a count of audience members; a number of logged in audience members; a predetermined day part; a predetermined program; a predetermined source identification (SID) code; a number of times that an audience measurement system at the first location is turned on; or whether the audience member is logged in.

105. (Previously Presented) An article of manufacture as defined in claim 200, wherein the machine readable instructions cause the machine to determine the first probability based upon tuning style.

106. (Previously Presented) An article of manufacture as defined in claim 105, wherein the machine readable instructions cause the machine to determine the first probability based on tuning history.

107. (Currently Amended) An article of manufacture as defined in claim [[91]] 105, wherein the machine readable instructions cause the machine to determine the first probability by computing a likelihood based upon past audience composition and tuning habits.

108. (Previously Presented) An article of manufacture as defined in claim 200 wherein the machine readable instructions cause the machine to suppress displaying a prompt to the audience if the first audience member has already entered the audience member identification.

109. (Previously Presented) An article of manufacture as defined in claim 200, wherein the machine readable instructions cause the machine to wait a pre-determined amount of time between prompting decisions.

110. (Previously Presented) An article of manufacture as defined in claim 109, wherein the machine readable instructions cause the machine to initially display a prompt to the audience to enter the audience member identification upon a detection that the measurement apparatus at the first location has been turned on,

111. (Previously Presented) An article of manufacture as defined in claim 200, wherein



the machine readable instructions cause the machine to display a prompt or add the audience member to the log of audience members at intermittent prompting occasions.

112. (Previously Presented) An article of manufacture as defined in claim 111 wherein the intermittent prompting occasions are nominally separated from one another by a period T, and wherein the period T varies depending upon prior responses to the prompting.

113. (Cancelled)

114. (Previously Presented) An article of manufacture as defined in claim 200, wherein the machine readable instructions cause the machine to:

store audience identification data in tables; and

collapse the tables if the tables contain insufficient data to make a prompting decision.

115. (Previously Presented) An article of manufacture as defined in claim 114 wherein the collapsing of the tables is weighted depending upon age of the audience member identification data.

116 – 117. (Cancelled)

118. (Previously Presented) An apparatus as defined in claim 206, wherein the first probability is computed based upon a number of times that the first audience member has been in an audience at the first location during a corresponding day part.

119. (Previously Presented) An apparatus as defined in claim 206, wherein the processor is programmed to determine the first probability based on a number of times that the first audience member was historically in an audience at the first location.

120. (Previously Presented) An apparatus as defined in claim 119, wherein the processor is programmed to determine the first probability based on a number of times that the measurement apparatus at the first location has been turned on.

121. (Cancelled)

122. (Previously Presented) An apparatus as defined in claim 119, wherein the processor is programmed to determine the first probability based upon at least one of tuning style or tuning patterns.

123. (Cancelled)

124. (Previously Presented) An apparatus as defined in claim 206, wherein the processor is programmed to determine the first probability using a heuristic.

125. (Previously Presented) An apparatus as defined in claim 124, wherein the

heuristic utilizes at least one of: a number of times that the first audience member has been in an audience at the first location; a count of audience members; a number of logged in audience members; a predetermined day part; a predetermined program; a predetermined source identification (SID) code; a number of times that an audience measurement system at the first location is turned on; or whether the first audience member is logged in.

126. (Previously Presented) An apparatus as defined in claim 206, wherein the processor is programmed to determine the first probability based upon tuning style.

127. (Previously Presented) An apparatus as defined in claim 206, wherein the processor is programmed to determine the first probability based upon audience composition and tuning habits.

128. (Previously Presented) An apparatus as defined in claim 206, wherein the processor is programmed to suppress presenting a prompt to the audience if the audience has already entered the user identification.

129. (Previously Presented) An apparatus as defined in claim 206, wherein the processor is programmed to wait a pre-determined amount of time between prompting decisions.

130. (Previously Presented) An apparatus as defined in claim 206, wherein the processor is programmed to prompt or suppress the prompting at intermittent prompting occasions.

131. (Previously Presented) An apparatus as defined in claim 130, wherein the intermittent prompting occasions are nominally separated from one another by a period T, and wherein the period T varies depending upon prior responses to the prompting.

132. (Cancelled)

133. (Previously Presented) An apparatus as defined in claim 206, wherein the processor is programmed to:

store audience identification data in tables; and

collapse the tables if the tables contain insufficient data to make a prompting decision.

134. (Previously Presented) A method as defined in claim 194, wherein determining the first probability that the person is in the audience comprises:

recording data indicative of historical tuning behavior for the person;

recording data indicative of current tuning behavior; and

comparing the data indicative of current tuning behavior to the data indicative of

historical tuning behavior.

135. (Previously Presented) A method as defined in claim 134, wherein the data indicative of historical tuning behavior comprises at least one of tuning velocity, tuning acceleration, channel clusters, pauses in tuning, subsets of programs tuned, duration of programs viewed, receivers viewed, or times of day.

136. (Previously Presented) A method as defined in claim 134, wherein recording the data indicative of historical tuning behavior comprises periodically prompting for an audience member identification to associate the data indicative of historical tuning behavior with the individual.

137. (Previously Presented) A method as defined in claim 136, wherein periods of time between periodic prompts increase over time.

138. (Previously Presented) A method as defined in claim 136, wherein periods of time between periodic prompts depends upon distinctiveness of the recorded data.

139. (Previously Presented) An article of manufacture as defined in claim 200, wherein the machine readable instructions cause the machine to determine the first probability that the person is in the audience by:

recording data indicative of historical tuning behavior for the person;

recording data indicative of current tuning behavior; and

comparing the data indicative of current tuning behavior to the data indicative of historical tuning behavior.

140. (Previously Presented) An article of manufacture as defined in claim 139, wherein the data indicative of historical tuning behavior comprises at least one of tuning velocity, tuning acceleration, channel clusters, pauses in tuning, subsets of programs tuned, duration of programs viewed, receivers viewed, or times of day.

141. (Previously Presented) An article of manufacture as defined in claim 139, wherein the machine readable instructions cause the machine to periodically prompt for an audience member identification to associate the data indicative of historical tuning behavior with the individual.

142. (Previously Presented) An article of manufacture as defined in claim 141, wherein the machine readable instructions cause the machine to sequentially increase periods of time between periodic prompts.

143. (Previously Presented) An article of manufacture as defined in claim 141, wherein the machine readable instructions cause the machine to adjust periods of time between periodic prompts based on distinctiveness of the recorded data,

144. (Previously Presented) An apparatus as defined in claim 206, wherein the processor is programmed to determine the probability that the person is in the audience by: recording data indicative of historical tuning behavior for the person;

recording data indicative of current tuning behavior; and

comparing the data indicative of current tuning behavior to the data indicative of historical tuning behavior.

145. (Previously Presented) An apparatus as defined in claim 144, wherein the data indicative of historical tuning behavior comprises at least one of tuning velocity, tuning acceleration, channel clusters, pauses in tuning, subsets of programs tuned, duration of programs viewed, receivers viewed, or times of day.

146. (Previously Presented) An apparatus as defined in claim 144, wherein the processor is programmed to periodically prompt for an audience member identification to associate the data indicative of historical tuning behavior with the individual.

147. (Previously Presented) An apparatus as defined in claim 146, wherein the processor is programmed to sequentially increase periods of time between periodic prompts.

148. (Previously Presented) An apparatus as defined in claim 146, wherein the processor is programmed to adjust periods of time between periodic prompts based on distinctiveness of the recorded data.

149. (Previously Presented) A method as defined in claim 194, wherein determining the first probability that the first audience member is in the audience comprises:

recording a first set of data associated with the first audience member;

recording a second set of data associated with the second audience member; and

comparing a recent set of audience inputs to the first and second sets of data.

150. (Previously Presented) A method as defined in claim 149, wherein comparing the recent set of audience inputs to the first and second sets of data uses at least one statistical difference between the first and second sets of data.

151. (Previously Presented) A method as defined in claim 149, wherein comparing the recent set of audience inputs to the first and second sets of data comprises comparing at least one

of average rate of channel changing, instantaneous rate of channel changing, acceleration of channel changing, subsets of channel viewed, duration of channel viewing, time of day, or direction of channel changing for the recent set of audience inputs to at least one of the first or second set of data.

152. (Previously Presented) A method as defined in claim 149, wherein recording the set of data associated with the first audience member comprises periodically prompting for an audience member identification to associate recorded data with the first audience member.

153. (Previously Presented) A method as defined in claim 152, wherein periods of time between periodic prompts increases over time.

154. (Previously Presented) A method as defined in claim 152, wherein periods of time between periodic prompts depends upon statistical distinctiveness between the first and the second sets of data.

155. (Previously Presented) An article of manufacture as defined in claim 200, wherein the machine readable instructions cause the machine to determine the first probability that the first audience member is in the audience by:

- recording a first set of data associated with the first audience member;
- recording a second set of data associated with the second audience member; and
- comparing a recent set of audience inputs to the first and second sets of data.

156. (Previously Presented) An article of manufacture as defined in claim 155, wherein the machine readable instructions cause the machine to compare the recent set of audience inputs to the first and second sets of data by using at least one statistical difference between the first and second sets of data.

157. (Previously Presented) An article of manufacture as defined in claim 155, wherein the machine readable instructions cause the machine to compare the recent set of audience inputs to the first and second sets of data by comparing at least one of average rate of channel changing, instantaneous rate of channel changing, acceleration of channel changing, subsets of channel viewed, duration of channel viewing, time of day, or direction of channel changing for the recent set of audience inputs to at least one of the first or second set of data.

158. (Previously Presented) An article of manufacture as defined in claim 155, wherein the machine readable instructions cause the machine to periodically prompt for an audience member identification to associate recorded data with the first audience member.

159. (Previously Presented) An article of manufacture as defined in claim 158, wherein the machine readable instructions cause the machine to sequentially increase periods of time between periodic prompts.

160. (Previously Presented) An article of manufacture as defined in claim 158, wherein the machine readable instructions cause the machine to adjust periods of time between periodic prompts based on statistical distinctiveness between the first and the second sets of data.

161. (Previously Presented) An apparatus as defined in claim 206, wherein the processor is programmed to determine the first probability that the first audience member is in the audience by:

- recording a first set of data associated with the first audience member;
- recording a second set of data associated with the second audience member; and
- comparing a recent set of audience inputs to the first and second sets of data.

162. (Previously Presented) An apparatus as defined in claim 161, wherein the processor is programmed to compare the recent set of audience inputs to the first and second sets of data by using at least one statistical difference between the first and second sets of data.

163. (Previously Presented) An apparatus as defined in claim 161, wherein the processor is programmed to compare the recent set of audience inputs to the first and second sets of data by comparing at least one of average rate of channel changing, instantaneous rate of channel changing, acceleration of channel changing, subsets of channel viewed, duration of channel viewing, time of day, or direction of channel changing for the recent set of audience inputs to at least one of the first and second set of data.

164. (Previously Presented) An apparatus as defined in claim 161, wherein the processor is programmed to periodically prompt for an audience member identification to associate recorded data with the first audience member.

165. (Previously Presented) An apparatus as defined in claim 164, wherein the processor is programmed to sequentially increase periods of time between periodic prompts.

166. (Previously Presented) An apparatus as defined in claim 164, wherein the processor is programmed to adjust periods of time between periodic prompts based on statistical distinctiveness between the first and the second sets of data.

167. (Previously Presented) A method as defined in claim 194, wherein determining the probability that the first audience member is in the audience comprises:

detecting a series of tuning events;  
recording a series of time intervals corresponding to time elapsed between sequential pairs of the tuning events; and  
comparing the tuning events to the series of time intervals.

168. (Previously Presented) A method as defined in 167, wherein identifying the first audience member comprises:

comparing the series of time intervals to a historical record of time intervals between tuning events associated with a plurality of audience members; and  
identifying which of the audience members caused the tuning events based on the comparison.

169. (Previously Presented) A method as defined in 167 further comprising at least one of:

recording a series of channels or program identifiers associated with respective ones of the series of tuning events; or

recording a series of time references associated with respective ones of the series of tuning events.

170. (Previously Presented) A method as defined in 169, wherein identifying the first audience member comprises:

comparing the series of time intervals to a historical record of time intervals between tuning events associated with a plurality of audience members;

comparing the series of channels or program identifiers to a historical record of tuned channels or programs; and

identifying which of the audience members caused the tuning events based on the comparisons.

171. (Previously Presented) A method as defined in 169, wherein identifying the first audience member comprises:

comparing the series of time intervals to a historical record of time intervals between tuning events associated with a plurality of audience members;

comparing the series of time references to a historical record of viewing times; and  
identifying which of the audience members caused the tuning events based on the comparisons.

172. (Previously Presented) An article of manufacture as defined in claim 200, wherein the machine readable instructions cause the machine to determine the probability that the first audience member is in the audience by:

- detecting a series of tuning events;
- recording a series of time intervals corresponding to time elapsed between sequential pairs of the tuning events;
- comparing the tuning events to the series of time intervals.

173. (Previously Presented) An article of manufacture as defined in 172, wherein the machine readable instructions cause the machine to identify the first audience member by:

- comparing the series of time intervals to a historical record of time intervals between tuning events associated with a plurality of audience members; and
- identifying which of the audience members caused the tuning events based on the comparison.

174. (Previously Presented) An article of manufacture as defined in 172 wherein the machine readable instructions cause the machine to perform at least one of:

- recording a series of channels or program identifiers associated with respective ones of the series of tuning events; or
- recording a series of time references associated with respective ones of the series of tuning events.

175. (Previously Presented) An article of manufacture as defined in 174, wherein the machine readable instructions cause the machine to identify the first audience member by:

- comparing the series of time intervals to a historical record of time intervals between tuning events associated with a plurality of audience members;
- comparing the series of channels or program identifiers to a historical record of tuned channels or programs; and
- identifying which of the audience members caused the tuning events based on the comparisons.

176. (Previously Presented) An article of manufacture as defined in 174, the machine readable instructions cause the machine to identify the first audience member by:

- comparing the series of time intervals to a historical record of time intervals between tuning events associated with a plurality of audience members;



comparing the series of time references to a historical record of viewing times; and  
identifying which of the audience members caused the tuning events based on the  
comparisons.

177. (Previously Presented) An apparatus as defined in claim 206, wherein the  
processor is programmed to determine the probability that the first audience member is in the  
audience by:

detecting a series of tuning events;  
recording a series of time intervals corresponding to time elapsed between sequential  
pairs of the tuning events; and  
comparing the tuning events the series of time intervals.

178. (Previously Presented) An apparatus as defined in 177, wherein the processor is  
programmed to identify the first audience member by:

comparing the series of time intervals to a historical record of time intervals between  
tuning events associated with a plurality of audience member; and  
identifying which of the audience members caused the tuning events based on the  
comparison.

179. (Previously Presented) An apparatus as defined in 177 wherein the processor is  
programmed to perform at least one of:

recording a series of channels or program identifiers associated with respective ones of  
the series of tuning events; or  
recording a series of time references associated with respective ones of the series of  
tuning events.

180. (Previously Presented) An apparatus as defined in 179, wherein the processor is  
programmed to identify the first audience member by:

comparing the series of time intervals to a historical record of time intervals between  
tuning events associated with a plurality of audience members;  
comparing the series of channels or program identifiers to a historical record of tuned  
channels or programs; and  
identifying which of the audience members caused the tuning events based on the  
comparisons.

181. (Previously Presented) An apparatus as defined in 179, the processor is programmed to identify the first audience member by:

comparing the series of time intervals to a historical record of time intervals between tuning events associated with a plurality of audience members;

comparing the series of time references to a historical record of viewing times; and  
identifying which of the audience members caused the tuning events based on the comparisons.

182 – 193. (Canceled)

194. (Previously Presented) A method comprising:

determining a count of audience members in an audience at a first location during a day part of a monitored day;

determining a first viewing count of a number of times that a first audience member was logged in to a measurement apparatus during the day part of one or more days prior to the monitored day;

determining a second viewing count of a number of times that a second audience member was logged in to the measurement apparatus during the day part of the one or more days prior to the monitored day;

determining a first probability that the first audience member is in the audience based on the first viewing count and the second viewing count;

comparing the first probability to a probability threshold;  
when at least one of the first probability traverses the probability threshold or the count is not equal to a number of audience members that are logged in to the measurement apparatus at the first location, presenting a prompt for user identification; and

storing an identification of at least one of the audience members.

195. (Previously Presented) A method as defined in claim 194, further comprising adding the first viewing count and the second viewing count to determine a total viewing count, wherein the first probability is based on the total viewing count.

196. (Previously Presented) A method as defined in claim 194, wherein storing an identification of at least one of the audience members comprises storing an identification of the first audience member.

197. (Previously Presented) A method as defined in claim 194, further comprising comparing the count of audience members to a number of audience members that are logged in to a measurement apparatus at the first location.

198. (Previously Presented) A method as defined in claim 194, wherein the first viewing count is based on the number of times that the first audience member was logged in to a second measurement apparatus at a second location.

199. (Previously Presented) A method as defined in claim 194, wherein the first viewing count is based on the number of times that the first audience member was logged in to the first measurement apparatus during exposure to a first program source.

200. (Previously Presented) An article of manufacture storing machine readable instructions which, when executed, cause a machine to:

- determine a count of audience members in an audience at a first location during a day part of a monitored day;

- determine a first viewing count of a number of times that a first audience member was logged in to the measurement apparatus during the day part of one or more days prior to the monitored day;

- determine a second viewing count of a number of times that a second audience member was logged in to the measurement apparatus during the day part of the one or more days prior to the monitored day;

- determine a first probability that the first audience member is in the audience based on the first viewing count and the second viewing count;

- compare the first probability to a probability threshold;

- when at least one of the first probability traverses the probability threshold or the count is not equal to a number of audience members that are logged in to the measurement apparatus at the first location, present a prompt for user identification; and

- store an identification of at least one of the audience members.

201. (Previously Presented) An article of manufacture as described in claim 200, wherein the machine readable instructions cause the machine to add the first viewing count and the second viewing count to determine a total viewing count, wherein the first probability is based on the total viewing count.

202. (Previously Presented) An article of manufacture as described in claim 200, wherein storing an identification of at least one of the audience members comprises storing an identification of the first audience member.

203. (Previously Presented) An article of manufacture as described in claim 200, wherein the machine readable instructions cause the machine to compare the count of audience members to a number of audience members that are logged in to a measurement apparatus at the first location.

204. (Previously Presented) An article of manufacture as described in claim 200, wherein the first viewing count is based on the number of times that the first audience member was logged in to a second measurement apparatus at a second location.

205. (Previously Presented) An article of manufacture as described in claim 200, wherein the first viewing count is based on the number of times that the first audience member was logged in to the first measurement apparatus during exposure to a first program source.

206. (Previously Presented) A measurement apparatus, comprising:

a memory; and

a processor coupled to the memory and programmed to:

determine a count of audience members in an audience at a first location during a day part of a monitored day;

determine a first viewing count of a number of times that a first audience member was logged in to the measurement apparatus during the day part of one or more days prior to the monitored day;

determine a second viewing count of a number of times that a second audience member was logged in to the measurement apparatus during the day part of the one or more days prior to the monitored day;

determine a first probability that the first audience member is in the audience based on the first viewing count and the second viewing count;

compare the first probability to a probability threshold;

when at least one of the first probability traverses the probability threshold or the count is not equal to a number of audience members that are logged in to the measurement apparatus at the first location, present a prompt for user identification; and

store an identification of at least one of the audience members.

207. (Previously Presented) An apparatus as described in claim 206, wherein the processor is further programmed to add the first viewing count and the second viewing count to determine a total viewing count, wherein the first probability is based on the total viewing count.

208. (Previously Presented) An apparatus as described in claim 206, wherein storing an identification of at least one of the audience members comprises storing an identification of the first audience member.

209. (Previously Presented) An apparatus as described in claim 206, wherein the processor is further programmed to compare the count of audience members to a number of audience members that are logged in to a measurement apparatus at the first location.

210. (Previously Presented) An apparatus as described in claim 206, wherein the first viewing count is based on the number of times that the first audience member was logged in to a second measurement apparatus at a second location.

211. (Previously Presented) An apparatus as described in claim 206, wherein the first viewing count is based on the number of times that the first audience member was logged in to the first measurement apparatus during exposure to a first program source.

212. (Previously Presented) A method comprising:  
storing a first audience identification information for one or more audience members in an audience of a program being viewed at a first location during a first day part;  
determining if a predetermined interval has passed after which to make a prompting decision;

determining a count of audience members present in the audience and a number of audience members associated with the stored audience identification information in response to determining the predetermined interval has passed;

determining an expected number of audience members based on historical tuning information for known audience members during corresponding day parts in response to determining that the count of audience members is equal to the number of audience members associated with the stored audience information;

determining whether the expected number of audience members is greater than a first threshold in response to determining the expected number;

determining a first probability that a first audience member is in the audience based on historical tuning information of the first audience member for the corresponding day parts and

determining a second probability that a second audience member is in the audience based on historical tuning information of the second audience member for the corresponding day parts in response to the expected number being greater than the first threshold;

determining that the first probability is greater than the second probability;

determining whether the first probability is greater than a second threshold in response to determining that the first probability is greater than the second probability;

determining whether the first audience member is one of the audience members associated with the stored audience identification information based on the first probability being greater than the threshold;

suppressing an identification prompt based on whether the first audience member is one of the audience members associated with the stored audience identification information; and

prompting the audience for a second audience identification information in response to failing to suppress the identification prompt.